Richard Carpenter Honeywell International, Inc. 3520 Westmoor Street South Bend, Indiana 46628-1373

Re: Significant Source Modification No:

141-12169-00172

Dear Mr. Carpenter:

Honeywell International, Inc. applied for a Part 70 operating permit on December 10, 1996 for an aircraft energy systems engineering and testing facility. An application to modify the source was received on April 13, 2000. Pursuant to 326 IAC 2-7-10.5 the following emission units are approved for construction at the source:

Eight (8) natural gas-fired turbines, identified as GT-1 through GT-8, rated at 8.71 million British thermal units per hour each, exhausting through Stack SGT-1 through SGT-8.

The proposed Significant Source Modification approval will be incorporated into the pending Part 70 permit application pursuant to 326 IAC 2-7-10.5(I)(3). If there are no changes to the proposed construction of the emission units, the source may begin operating on the date that IDEM receives an affidavit of construction pursuant to 326 IAC 2-7-10.5(h). If there are any changes to the proposed construction the source can not operate until an Operation Permit Validation Letter is issued.

This decision is subject to the Indiana Administrative Orders and Procedures Act - IC 4-21.5-3-5. If you have any questions on this matter call (800) 451-6027, press 0 and ask for Frank P. Castelli, c/o OAM, 100 North Senate Avenue, P.O. Box 6015, Indianapolis, Indiana, 46206-6015, at 631-691-3395 or in Indiana at 1-800-451-6027 (ext 631-691-3395).

Sincerely,

Paul Dubenetzky, Chief Permits Branch Office of Air Management

Attachments FPC/MES

cc: File - St. Joseph County U.S. EPA, Region V

St. Joseph County Health Department

Northern Regional Office

Air Compliance Section Inspector - Rick Reynolds

Compliance Data Section - Mendy Jones

Administrative and Development - Janet Mobley Technical Support and Modeling - Michele Boner

PART 70 SIGNIFICANT SOURCE MODIFICATION OFFICE OF AIR MANAGEMENT

Honeywell International, Inc. 3520 Westmoor Street South Bend, Indiana 46628-1373

(herein known as the Permittee) is hereby authorized to construct and operate subject to the conditions contained herein, the emission units described in Section A (Source Summary) of this approval.

This approval is issued in accordance with 326 IAC 2 and 40 CFR Part 70 Appendix A and contains the conditions and provisions specified in 326 IAC 2-7 as required by 42 U.S.C. 7401, et. seq. (Clean Air Act as amended by the 1990 Clean Air Act Amendments), 40 CFR Part 70.6, IC 13-15 and IC 13-17.

Source Modification No.: 141-12169-00172	
Issued by: Paul Dubenetzky, Branch Chief Office of Air Management	Issuance Date:

Page 2 of 12 Source Modification No. 141-12169-00172

TABLE OF CONTENTS

A SOURCE SUMMARY

- A.1 General Information [326 IAC 2-7-4(c)] [326 IAC 2-7-5(15)]
- A.2 Emission Units and Pollution Control Equipment Summary [326 IAC 2-7-4(c)(3)]
- A.3 Part 70 Permit Applicability [326 IAC 2-7-2]

B GENERAL CONSTRUCTION CONDITIONS

- B.1 Definitions [326 IAC 2-7-1]
- B.2 Effective Date of the Permit [IC13-15-5-3]
- B.3 Revocation of Permits [326 IAC 2-1.1-9(5)][326 IAC 2-7-10.5(i)]
- B.4 Significant Source Modification [326 IAC 2-7-10.5(h)]

C GENERAL OPERATION CONDITIONS

- C.1 Certification [326 IAC 2-7-4(f)] [326 IAC 2-7-6(1)][326 IAC 2-7-5(3)(C)]
- C.2 Preventive Maintenance Plan [326 IAC 2-7-5(1),(3) and (13)] [326 IAC 2-7-6(1) and (6)]
- C.3 Permit Amendment or Modification [326 IAC 2-7-11] [326 IAC 2-7-12]
- C.4 Opacity [326 IAC 5-1]
- C.5 Operation of Equipment [326 IAC 2-7-6(6)]
- C.6 Performance Testing [326 IAC 3-6][326 IAC 2-1.1-11]
- C.7 Compliance Monitoring [326 IAC 2-7-5(3)] [326 IAC 2-7-6(1)]
- C.8 Actions Related to Noncompliance Demonstrated by a Stack Test [326 IAC 2-7-5]
- C.9 Monitoring Data Availability [326 IAC 2-7-6(1)] [326 IAC 2-7-5(3)]
- C.10 General Record Keeping Requirements [326 IAC 2-7-5(3)]
- C.11 General Reporting Requirements [326 IAC 2-7-5(3)(C)]

D.1 FACILITY OPERATION CONDITIONS - Eight (8) natural gas-fired turbines

Emission Limitations and Standards [326 IAC 2-7-5(1)]

D.1.1 NO_x [326 IAC 2-2]

Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

- D.1.2 Record Keeping Requirements
- D.1.3 Reporting Requirements

Certification

Quarterly Report

Honeywell International, Inc.

South Bend, Indiana

Page 3 of 12

Source Modification No. 141-12169-00172

Permit Reviewer: FPC/MES

SECTION A

SOURCE SUMMARY

This approval is based on information requested by the Indiana Department of Environmental Management (IDEM), Office of Air Management (OAM). The information describing the emission units contained in conditions A.1 through A.2 is descriptive information and does not constitute enforceable conditions. However, the Permittee should be aware that a physical change or a change in the method of operation that may render this descriptive information obsolete or inaccurate may trigger requirements for the Permittee to obtain additional permits or seek modification of this approval pursuant to 326 IAC 2, or change other applicable requirements presented in the permit application.

A.1 General Information [326 IAC 2-7-4(c)] [326 IAC 2-7-5(15)]

The Permittee owns and operates a stationary aircraft energy systems engineering and testing facility.

Responsible Official: Adriane Brown

Source Address: 3520 Westmoor Street, South Bend, Indiana 46628-1373 Mailing Address: 3520 Westmoor Street, South Bend, Indiana 46628-1373

Phone Number: 219 - 231 - 2000 SIC Code: 3728 and 3724 County Location: St. Joseph

County Status: Attainment for all criteria pollutants

Source Status: Part 70 Permit Program Major Source, under PSD;

Major Source, Section 112 of the Clean Air Act

A.2 Emission Units and Pollution Control Equipment Summary [326 IAC 2-7-4(c)(3)] [326 IAC 2-7-5(15)]

This stationary source is approved to construct and operate the following emission units and pollution control devices:

(a) Eight (8) natural gas-fired turbines, identified as GT-1 through GT-8, rated at 8.71 million British thermal units per hour each, exhausting through Stack SGT-1 through SGT-8.

A.3 Part 70 Permit Applicability [326 IAC 2-7-2]

This stationary source is required to have a Part 70 permit by 326 IAC 2-7-2 (Applicability) because:

- (a) It is a major source, as defined in 326 IAC 2-7-1(22);
- (b) It is a source in a source category designated by the United States Environmental Protection Agency (U.S. EPA) under 40 CFR 70.3 (Part 70 Applicability).

Page 4 of 12 Source Modification No. 141-12169-00172

SECTION B

GENERAL CONSTRUCTION CONDITIONS

B.1 Definitions [326 IAC 2-7-1]

Terms in this approval shall have the definition assigned to such terms in the referenced regulation. In the absence of definitions in the referenced regulation, any applicable definitions found in IC 13-11, 326 IAC 1-2 and 326 IAC 2-7 shall prevail.

B.2 Effective Date of the Permit [IC13-15-5-3]

Pursuant to IC 13-15-5-3, this approval becomes effective upon its issuance.

B.3 Revocation of Permits [326 IAC 2-1.1-9(5)][326 IAC 2-7-10.5(i)]

Pursuant to 326 IAC 2-1.1-9(5)(Revocation of Permits), the Commissioner may revoke this approval if construction is not commenced within eighteen (18) months after receipt of this approval or if construction is suspended for a continuous period of one (1) year or more.

B.4 Significant Source Modification [326 IAC 2-7-10.5(h)]

This document shall also become the approval to operate pursuant to 326 IAC 2-7-10.5(h) when, prior to start of operation, the following requirements are met:

- (a) The attached affidavit of construction shall be submitted to the Office of Air Management (OAM), Permit Administration & Development Section:
 - (1) If the affidavit of construction verifies that the emission units were constructed as proposed in the application, then the emissions units covered in the Significant Source Modification approval may begin operating on the date the affidavit of construction is postmarked or hand delivered to IDEM if constructed as proposed.
 - (2b) If the affidavit of construction verifies that actual construction of the emissions units differs from the construction proposed in the application, the source may not begin operation until the source modification has been revised pursuant to 326 IAC 2-7-11 or 326 IAC 2-7-12 and an Operation Permit Validation Letter is issued.
- (be) If construction is completed in phases; i.e., the entire construction is not done continuously, a separate affidavit must be submitted for each phase of construction. Any permit conditions associated with operation start up dates such as stack testing for New Source Performance Standards (NSPS) shall be applicable to each individual phase.
- (cd) Upon receipt of an Operation Permit Validation Letter from the Chief of the Permit Administration & Development Section and attach it to this document.

Honeywell International, Inc.

South Bend, Indiana

Page 5 of 12

Source Modification No. 141-12169-00172

Permit Reviewer: FPC/MES

SECTION C

GENERAL OPERATION CONDITIONS

C.1 Certification [326 IAC 2-7-4(f)][326 IAC 2-7-6(1)][326 IAC 2-7-5(3)(C)]

- (a) Where specifically designated by this approval or required by an applicable requirement, any form, report, or compliance certification prepared as required and submitted under this approval shall contain certification by a responsible official of truth, accuracy, and completeness. This certification, shall state that, based on information and belief formed after reasonable inquiry, the statements and information in the document are true, accurate, and complete.
- (b) One (1) certification shall be included, on the attached Certification Form, with each submittal.
- (c) A responsible official is defined at 326 IAC 2-7-1(34).

C.2 Preventive Maintenance Plan [326 IAC 2-7-5(1),(3) and (13)] [326 IAC 2-7-6(1) and (6)] [326 IAC 1-6-3]

- (a) If required by specific condition(s) in Section D of this approval, the Permittee shall prepare and maintain Preventive Maintenance Plans (PMP) within ninety (90) days but no more than ninety (90) days) after issuance of this approval, including the following information on each facility:
 - (1) Identification of the individual(s) responsible for inspecting, maintaining, and repairing emission control devices;
 - (2) A description of the items or conditions that will be inspected and the inspection schedule for said items or conditions:
 - (3) Identification and quantification of the replacement parts that will be maintained in inventory for quick replacement.

If due to circumstances beyond its control, the PMP cannot be prepared and maintained within the above time frame, the Permittee may extend the date an additional ninety (90) days provided the Permittee notifies:

Indiana Department of Environmental Management Compliance Branch, Office of Air Management 100 North Senate Avenue, P. O. Box 6015 Indianapolis, Indiana 46206-6015

- (b) The Permittee shall implement the Preventive Maintenance Plans as necessary to ensure that failure to implement the Preventive Maintenance Plan does not cause or contribute to a violation of any limitation on emissions or potential to emit.
- (c) PMP's shall be submitted to IDEM, OAM, upon request and the information in the Plan required by 326 IAC 1-6-3 shall be subject to review and approval by IDEM, OAM. IDEM, OAM, may require the Permittee to revise its Preventive Maintenance Plan whenever lack of proper maintenance causes or contributes to any violation.

C.3 Permit Amendment or Modification [326 IAC 2-7-11] [326 IAC 2-7-12]

(a) The Permittee must comply with the requirements of 326 IAC 2-7-11 or 326 IAC 2-7-12 whenever the Permittee seeks to amend or modify this approval.

(b) Any application requesting an amendment or modification of this approval shall be submitted to:

Indiana Department of Environmental Management Permits Branch, Office of Air Management 100 North Senate Avenue, P.O. Box 6015 Indianapolis, Indiana 46206-6015

Any such application should be certified by the "responsible official" as defined by 326 IAC 2-7-1(34) only if a certification is required by the terms of the applicable rule

(c) The Permittee may implement administrative amendment changes addressed in the request for an administrative amendment immediately upon submittal of the request. [326 IAC 2-7-11(c)(3)]

C.4 Opacity [326 IAC 5-1]

Pursuant to 326 IAC 5-1-2 (Opacity Limitations), except as provided in 326 IAC 5-1-3 (Temporary alternative opacity limitations), visible emissions shall meet the following, unless otherwise stated in this approval:

- (a) Opacity shall not exceed an average of thirty percent (30%) in any one (1) six (6) minute averaging period as determined in 326 IAC 5-1-4.
- (b) Opacity shall not exceed sixty percent (60%) for more than a cumulative total of fifteen (15) minutes (sixty (60) readings) as measured according to 40 CFR 60, Appendix A, Method 9 or fifteen (15) one (1) minute nonoverlapping integrated averages for a continuous opacity monitor in a six (6) hour period.

C.5 Operation of Equipment [326 IAC 2-7-6(6)]

Except as otherwise provided in this approval, all air pollution control equipment listed in this approval and used to comply with an applicable requirement shall be operated at all times that the emission units vented to the control equipment are in operation.

Testing Requirements [326 IAC 2-7-6(1)]

C.6 Performance Testing [326 IAC 3-6][326 IAC 2-1.1-11]

(a) Compliance testing on new emission units shall be conducted within 60 days after achieving maximum production rate, but no later than 180 days after initial start-up, if specified in Section D of this approval. All testing shall be performed according to the provisions of 326 IAC 3-6 (Source Sampling Procedures), except as provided elsewhere in this approval, utilizing any applicable procedures and analysis methods specified in 40 CFR 51, 40 CFR 60, 40 CFR 61, 40 CFR 63, 40 CFR 75, or other procedures approved by IDEM, OAM.

A test protocol, except as provided elsewhere in this approval, shall be submitted to:

Indiana Department of Environmental Management Compliance Data Section, Office of Air Management 100 North Senate Avenue, P. O. Box 6015 Indianapolis, Indiana 46206-6015

no later than thirty-five (35) days prior to the intended test date. The Permittee shall submit a notice of the actual test date to the above address so that it is received at least two weeks prior to the test date.

(b) All test reports must be received by IDEM, OAM within forty-five (45) days after the completion of the testing. An extension may be granted by the IDEM, OAM, if the source

submits to IDEM, OAM, a reasonable written explanation within five (5) days prior to the end of the initial forty-five (45) day period.

The documentation submitted by the Permittee does not require certification by the "responsible official" as defined by 326 IAC 2-7-1(34).

Compliance Monitoring Requirements [326 IAC 2-7-5(1)] [326 IAC 2-7-6(1)]

C.7 Compliance Monitoring [326 IAC 2-7-5(3)] [326 IAC 2-7-6(1)]

Compliance with applicable requirements shall be documented as required by this permit. The Permittee shall be responsible for installing any necessary equipment and initiating any required monitoring related to that equipment. All monitoring and record keeping requirements not already legally required shall be implemented when operation begins.

Corrective Actions and Response Steps [326 IAC 2-7-5] [326 IAC 2-7-6]

- C.8 Actions Related to Noncompliance Demonstrated by a Stack Test [326 IAC 2-7-5] [326 IAC 2-7-6]
 - (a) When the results of a stack test performed in conformance with Section C Performance Testing, of this approval exceed the level specified in any condition of this approval, the Permittee shall take appropriate corrective actions. The Permittee shall submit a description of these corrective actions to IDEM, OAM, within thirty (30) days of receipt of the test results. The Permittee shall take appropriate action to minimize emissions from the affected facility while the corrective actions are being implemented.
 - (b) A retest to demonstrate compliance shall be performed within one hundred twenty (120) days of receipt of the original test results. Should the Permittee demonstrate to IDEM, OAM that retesting in one-hundred and twenty (120) days is not practicable, IDEM, OAM may extend the retesting deadline.
 - (c) IDEM, OAM reserves the authority to use enforcement activities to resolve noncompliant stack tests.

The documents submitted pursuant to this condition do not require the certification by the "responsible official" as defined by 326 IAC 2-7-1(34).

Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

C.9 Monitoring Data Availability [326 IAC 2-7-6(1)] [326 IAC 2-7-5(3)]

- (a) If for reasons beyond its control, the operator fails to make required observations, sampling, maintenance procedures, or record keeping, as specifically required in Section D Compliance Monitoring and Record Keeping Requirements, reasons for this must be recorded.
- (b) At its discretion, IDEM may excuse such failure providing adequate justification is documented and such failures do not exceed five percent (5%) of the operating time in any quarter.
- (c) Temporary, unscheduled unavailability of staff qualified to perform the required observations, sampling, maintenance procedures, or record keeping shall be considered a valid reason for failure to perform the requirements stated in (a) above.

C.10 General Record Keeping Requirements [326 IAC 2-7-5(3)][326 IAC 2-7-6]

(a) Records of all required monitoring data and support information shall be retained for a period of at least five (5) years from the date of monitoring sample, measurement, report, or application. These records shall be kept at the source location for a minimum of three

South Bend, Indiana Permit Reviewer: FPC/MES

- (3) years and available upon the request of an IDEM, OAM, representative. The records may be stored elsewhere for the remaining two (2) years as long as they are available upon request. If the Commissioner makes a written request for records to the Permittee, the Permittee shall furnish the records to the Commissioner within a reasonable time.
- (b) Records of required monitoring information shall include, where specified in Section D:
 - (1) The date, place, and time of sampling or measurements;
 - (2) The dates analyses were performed;
 - (3) The company or entity performing the analyses;
 - (4) The analytic techniques or methods used;
 - (5) The results of such analyses; and
 - (6) The operating conditions existing at the time of sampling or measurement.
- (c) Support information shall include, where specified in Section D:
 - (1) Copies of all reports required by this approval;
 - (2) All original strip chart recordings for continuous monitoring instrumentation;
 - (3) All calibration and maintenance records;
 - (4) Records of preventive maintenance shall be sufficient to demonstrate that failure to implement the Preventive Maintenance Plan did not cause or contribute to a violation of any limitation on emissions or potential to emit. To be relied upon subsequent to any such violation, these records may include, but are not limited to: work orders, parts inventories, and operator's standard operating procedures. Records of response steps taken shall indicate whether the response steps were performed in accordance with the Compliance Response Plan required by Section C Compliance Monitoring Plan Failure to take Response Steps, of this approval, and whether a deviation from an approval condition was reported. All records shall briefly describe what maintenance and response steps were taken and indicate who performed the tasks.
- (d) All record keeping requirements not already legally required shall be implemented within ninety (90) days of approval issuance.

C.11 General Reporting Requirements [326 IAC 2-7-5(3)(C)]

(a) The reports required by conditions in Section D of this approval shall be submitted to:

Indiana Department of Environmental Management Compliance Data Section, Office of Air Management 100 North Senate Avenue, P. O. Box 6015 Indianapolis, Indiana 46206-6015

(b) Unless otherwise specified in this approval, any notice, report, or other submission required by this approval shall be considered timely if the date postmarked on the envelope or certified mail receipt, or affixed by the shipper on the private shipping receipt, is on or before the date it is due. If the document is submitted by any other means, it shall be considered timely if received by IDEM, OAM, on or before the date it is due.

Page 9 of 12 Source Modification No. 141-12169-00172

- (c) Unless otherwise specified in this approval, any quarterly report shall be submitted within thirty (30) days of the end of the reporting period. The reports do not require the certification by the "responsible official" as defined by 326 IAC 2-7-1(34).
- (d) The first report shall cover the period commencing on the date of issuance of this approval and ending on the last day of the reporting period.

SECTION D.1 FACILITY OPERATION CONDITIONS

Facility Description [326 IAC 2-7-5(15)]:

Eight (8) natural gas-fired turbines, identified as GT-1 through GT-8, rated at 8.71 million British thermal units per hour each, exhausting through Stack SGT-1 through SGT-8.

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-7-5(1)]

D.1.1 NO_x [326 IAC 2-2]

The natural gas throughput to the eight (8) turbines shall be limited to one hundred and eighty (180) million cubic feet per twelve (12) consecutive month period, equivalent to NO_x emissions of thirtynine and six tenths (39.6) tons per year. Therefore, the requirements of 326 IAC 2-2 (Prevention of Significant Deterioration (PSD)) do not apply.

Record Keeping and Reporting Requirements [326 IAC 2-7-5(3)] [326 IAC 2-7-19]

D.1.2 Record Keeping Requirements

- (a) To document compliance with Condition D.1.1, the Permittee shall maintain records of the natural gas usage monthly.
- (b) All records shall be maintained in accordance with Section C General Record Keeping Requirements, of this permit.

D.1.3 Reporting Requirements

A quarterly summary of the information to document compliance with Condition D.1.1 shall be submitted to the address listed in Section C - General Reporting Requirements, of this permit, using the reporting forms located at the end of this permit, or their equivalent, within thirty (30) days after the end of the quarter being reported. The report submitted by the Permittee does not require the certification by the "responsible official" as defined by 326 IAC 2-7-1(34).

Page 11 of 12 Source Modification No. 141-12169-00172

INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT OFFICE OF AIR MANAGEMENT COMPLIANCE DATA SECTION

PART 70 SOURCE MODIFICATION CERTIFICATION

Source Name: Honeywell International, Inc.

Source Address: 3520 Westmoor Street, South Bend, Indiana 46628-1373 Mailing Address: 3520 Westmoor Street, South Bend, Indiana 46628-1373

Source Modification No.: 141-12169-00172

This certification shall be included when submitting monitoring, testing reports/results or other documents as required by this approval.	
Please check what document is being certified:	
9 Test Result (specify)	
9 Report (specify)	
9 Notification (specify)	
9 Other (specify)	
I certify that, based on information and belief formed after reasonable inquiry, the statements an information in the document are true, accurate, and complete.	d
Signature:	
Printed Name:	
Title/Position:	
Date:	

Phone:

Page 12 of 12 Source Modification No. 141-12169-00172

INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT OFFICE OF AIR MANAGEMENT COMPLIANCE DATA SECTION

	Part 70 Source Modification Quarterly Report					
Source Name: Source Address: Mailing Address: Source Modification No.: Facility: Parameter: Limit: Honeywell International, Inc. 3520 Westmoor Street, South Bend, Indiana 46628-1373 3520 Westmoor Street, South Bend, Indiana 46628-1373 141-12169-00172 Eight (8) natural gas-fired turbines (GT-1 through GT-8) Natural gas fuel usage Total 180 million cubic feet per twelve (12) consecutive month page YEAR:						
	Month	Natural Gas Usage (MMCF)	Natural Gas Usage (MMCF)	Natural Gas Usage (MMCF)		
		This Month	Previous 11 Months	12 Month Total		
	9	No deviation occurre	ed in this month.			
	9 Deviation/s occurred in this month. Deviation has been reported on:					
	Submitted by:					
	Title/l	Position:				
	Signa	·				
	Date:	•				

Indiana Department of Environmental Management Office of Air Management

Addendum to the Technical Support Document for a Part 70 Significant Source Modification

Source Name: Honeywell International, Inc.

Source Location: 3520 Westmoor Street, South Bend, Indiana 46628-1373

County: St. Joseph
SIC Code: 3728 and 3724
Source Modification: 141-12169-00172
Permit Reviewer: Frank P. Castelli

On June 19, 2000, the Office of Air Management (OAM) had a notice published in the South Bend Tribune, South Bend, Indiana, stating that Honeywell International, Inc. had applied for a Significant Source Modification for an aircraft energy systems engineering and testing facility. The notice also stated that OAM proposed to issue a Significant Source Modification for this operation and provided information on how the public could review the proposed Significant Source Modification and other documentation. Finally, the notice informed interested parties that there was a period of thirty (30) days to provide comments on whether or not this Significant Source Modification should be issued as proposed.

On July 13, 2000, Anne Slaughter Andrew, Esq. of Baker & Daniels submitted comments on behalf of Honeywell International on the proposed Significant Source Modification. The comments are as follows: The permit language, if changed, has deleted language as strikeouts and new language bolded.

Comment 1:

In Section A, delete the following wording:

This approval is based on information requested by the Indiana Department of Environmental Management (IDEM), Office of Air Management (OAM). The information describing the emission units contained in conditions A.1 through A.2 is descriptive information and does not constitute enforceable conditions. However, the Permittee should be aware that a physical change or a change in the method of operation that may render this descriptive information obsolete or inaccurate—may trigger requirements for the Permittee to obtain additional permits or seek modification of this approval pursuant to 326 IAC 2, or change other applicable requirements presented in the permit application.

Response 1:

The Section A wording is the standard wording of a Part 70 Operating Permit source modification. The wording that is requested to be deleted supports the statement that any changes in the descriptive information of the emission units may require approval pursuant to 326 IAC 2. Therefore the wording of Section A has not been revised.

Comment 2:

Correct the County Status and delete PSD and Section 112 Source Status in Condition A.1

Honeywell International Inc. Page 2 of 11 South Bend, Indiana Source Modification No. 141-12169-00172

Permit Reviewer: FPC/MES

Response 2:

Condition A.1 has been changed as follows:

A.1 General Information [326 IAC 2-7-4(c)] [326 IAC 2-7-5(15)]

The Permittee owns and operates a stationary aircraft energy systems engineering and testing facility.

Responsible Official: Adriane Brown

Source Address: 3520 Westmoor Street, South Bend, Indiana 46628-1373 Mailing Address: 3520 Westmoor Street, South Bend, Indiana 46628-1373

Phone Number: 219 - 231 - 2000 SIC Code: 3728 and 3724 County Location: St. Joseph

County Status: Nonattainment for particulate matter

Attainment for all other criteria pollutants

Source Status: Part 70 Permit Program

Major Source, under PSD;

Major Source, Section 112 of the Clean Air Act

The PSD and Section 112 source statuses are accurate as stated and will not be deleted.

Comment 3:

Delete Condition B.1 as follows:

B.1 Permit No Defense [IC 13]

This approval to construct does not relieve the Permittee of the responsibility to comply with the provisions of the Indiana Environmental Management Law (IC 13-11 through 13-20; 13-22 through 13-25; and 13-30), the Air Pollution Control Law (IC 13-17) and the rules promulgated thereunder, as well as other applicable local, state, and federal requirements.

Response 3:

Permit Condition B.1, "Permit No Defense", has been deleted from the Permit.

Comment 4:

Condition B.5 should be changed as follows:

B.5 Significant Source Modification [326 IAC 2-7-10.5(h)]

This document shall also become the approval to operate pursuant to 326 IAC 2-7-10.5(h) when, prior to start of operation, the following requirements are met:

- (a) The attached affidavit of construction shall be submitted to the Office of Air Management (OAM), Permit Administration & Development Section:
 - (1) verifying If the affidavit of construction verifies that the emission units were constructed as proposed in the application, then the emissions units covered in the Significant Source Modification approval may begin operating on the date the

Page 3 of 11 Source Modification No. 141-12169-00172

- affidavit of construction is postmarked or hand delivered to IDEM if constructed as proposed.
- (2b) If the affidavit of construction verifies that actual construction of the emissions units differs from the construction proposed in the application, the source may not begin operation until the source modification has been revised pursuant to 326 IAC 2-7-11 or 326 IAC 2-7-12 and an Operation Permit Validation Letter is issued.
- (be) If construction is completed in phases; i.e., the entire construction is not done continuously, a separate affidavit must be submitted for each phase of construction. Any permit conditions associated with operation start up dates such as stack testing for New Source Performance Standards (NSPS) shall be applicable to each individual phase.
- (cd) Upon receipt of The Permittee shall receive an Operation Permit Validation Letter from the Chief of the Permit Administration & Development Section and attach it to this document.

However, in the event that the Title V application is being processed at the same time as this application, the following additional procedures shall be followed for obtaining the right to operate:

- (1) If the Title V draft permit has not gone on public notice, then the change/addition covered by the Significant Source Modification will be included in the Title V draft.
- (2) If the Title V permit has gone thru final EPA proposal and would be issued ahead of the Significant Source Modification, the Significant Source Modification will go thru a concurrent 45 day EPA review. Then the Significant Source Modification will be incorporated into the final Title V permit at the time of issuance.
- (3) If the Title V permit has not gone thru final EPA review and would be issued after the Significant Source Modification is issued, then the Modification would be added to the proposed Title V permit, and the Title V permit will issued after EPA review.

Response 4:

Condition B.5(a) has been revised as follows for clarification and Condition B.5(d)(1-3) has been deleted from the Permit:

B.5 Significant Source Modification [326 IAC 2-7-10.5(h)]

This document shall also become the approval to operate pursuant to 326 IAC 2-7-10.5(h) when, prior to start of operation, the following requirements are met:

- (a) The attached affidavit of construction shall be submitted to the Office of Air Management (OAM), Permit Administration & Development Section:
 - (1) verifying If the affidavit of construction verifies that the emission units were constructed as proposed in the application, then the emissions units covered in the Significant Source Modification approval may begin operating on the date the affidavit of construction is postmarked or hand delivered to IDEM if constructed as proposed.

Page 4 of 11 Source Modification No. 141-12169-00172

- (2b) If the affidavit of construction verifies that actual construction of the emissions units differs from the construction proposed in the application, the source may not begin operation until the source modification has been revised pursuant to 326 IAC 2-7-11 or 326 IAC 2-7-12 and an Operation Permit Validation Letter is issued.
- (be) If construction is completed in phases; i.e., the entire construction is not done continuously, a separate affidavit must be submitted for each phase of construction. Any permit conditions associated with operation start up dates such as stack testing for New Source Performance Standards (NSPS) shall be applicable to each individual phase.
- (cd) Upon receipt of The Permittee shall receive an Operation Permit Validation Letter from the Chief of the Permit Administration & Development Section and attach it to this document.

However, in the event that the Title V application is being processed at the same time as this application, the following additional procedures shall be followed for obtaining the right to operate:

- (1) If the Title V draft permit has not gone on public notice, then the change/addition covered by the Significant Source Modification will be included in the Title V draft.
- (2) If the Title V permit has gone thru final EPA proposal and would be issued ahead of the Significant Source Modification, the Significant Source Modification will go thru a concurrent 45 day EPA review. Then the Significant Source Modification will be incorporated into the final Title V permit at the time of issuance.
- (3) If the Title V permit has not gone thru final EPA review and would be issued after the Significant Source Modification is issued, then the Modification would be added to the proposed Title V permit, and the Title V permit will issued after EPA review.

Comment 5:

Delete and add the following language Condition C.1(a) as follows:

C.1 Certification [326 IAC 2-7-4(f)][326 IAC 2-7-6(1)][326 IAC 2-7-5(3)(C)]

(a) Where specifically designated by this approval or required by an applicable requirement, any application form, report, or compliance certification prepared as required by and submitted under this approval shall contain certification by a responsible official of truth, accuracy, and completeness. This certification, shall state that, based on information and belief formed after reasonable inquiry, the statements and information in the document are true, accurate, and complete.

Response 5:

Condition C.1, "Certification", was revised as follows:

C.1 Certification [326 IAC 2-7-4(f)][326 IAC 2-7-6(1)][326 IAC 2-7-5(3)(C)]

(a) Where specifically designated by this approval or required by an applicable requirement, any application form, report, or compliance certification prepared as required by and submitted under this approval shall contain certification by a responsible official of truth, accuracy, and completeness. This certification, shall state that, based on information and

belief formed after reasonable inquiry, the statements and information in the document are true, accurate, and complete.

Comment 6:

Add the following wording to Condition C.2(c):

- C.2 Preventive Maintenance Plan [326 IAC 2-7-5(1),(3) and (13)] [326 IAC 2-7-6(1) and (6)] [326 IAC 1-6-3]
 - (c) PMP's shall be submitted to IDEM, OAM, upon request and *the information in the Plan required by 326 IAC 1-6-3* shall be subject to review and approval by IDEM, OAM. IDEM, OAM, may require the Permittee to revise its Preventive Maintenance Plan whenever lack of proper maintenance causes or contributes to any violation.

Response 6:

Condition C.2(c) has been revised as suggested to clarify what may be required to be submitted to IDEM pursuant to 326 IAC 1-6-3.

- C.2 Preventive Maintenance Plan [326 IAC 2-7-5(1),(3) and (13)] [326 IAC 2-7-6(1) and (6)] [326 IAC 1-6-3]
 - (c) PMP's shall be submitted to IDEM, OAM, upon request and **the information in the Plan required by 326 IAC 1-6-3** shall be subject to review and approval by IDEM, OAM. IDEM, OAM, may require the Permittee to revise its Preventive Maintenance Plan whenever lack of proper maintenance causes or contributes to any violation.

Comment 7:

Delete Condition C.5 as follows:

C.5 Operation of Equipment [326 IAC 2-7-6(6)]

Except as otherwise provided in this approval, all air pollution control equipment listed in this approval and used to comply with an applicable requirement shall be operated at all times that the emission units vented to the control equipment are in operation.

Response 7:

This condition is necessary to insure that all equipment required to comply with any applicable requirement is operated at all times. Therefore, no changes were made to the permit.

Comment 8:

In Condition C.6, delete the first sentence and change the wording so that it is clear that the condition applies only if testing is specified in Section D as follows:

C.6 Performance Testing [326 IAC 3-6][326 IAC 2-1.1-11]

(a) Compliance testing on new emission units shall be conducted within 60 days after achieving

Page 6 of 11 Source Modification No. 141-12169-00172

maximum production rate, but no later than 180 days after initial start-up, if specified in Section D of this approval. All testing specified in Section D of this approval shall be performed according to the provisions of 326 IAC 3-6 (Source Sampling Procedures), except as provided elsewhere in this approval, utilizing any applicable procedures and analysis methods specified in 40 CFR 51, 40 CFR 60, 40 CFR 61, 40 CFR 63, 40 CFR 75, or other procedures approved by IDEM, OAM.

Response 8:

It is not necessary to delete the wording as suggested since it already says that the requirements only apply if testing is specified in Section D of the permit. Therefore, no changes to the proposed permit are necessary.

Comment 9:

In Condition C.7, remove the first and second sentences as follows:

C.7 Compliance Monitoring [326 IAC 2-7-5(3)] [326 IAC 2-7-6(1)]

Compliance with applicable requirements shall be documented as required by this permit. The Permittee shall be responsible for installing any necessary equipment and initiating any required monitoring related to that equipment. All monitoring and record keeping requirements not already legally required shall be implemented when operation begins.

Response 9:

This condition is necessary to insure that the compliance with all applicable requirements of the permit are documented and that the Permittee installs all necessary monitoring equipment and initiates all required monitoring. Therefore, no change to the permit is required.

Comment 10:

Revise Condition C.8 as follows:

- C.8 Actions Related to Noncompliance Demonstrated by a Stack Test [326 IAC 2-7-5] [326 IAC 2-7-6]
 - When the results of a stack test performed in conformance with Section C Performance Testing, of this approval exceed the level specified in any condition of this approval, the Permittee shall take appropriate corrective actions. The Permittee shall submit a description of these corrective actions to IDEM, OAM, within thirty (30) days of receipt of the test results. The Permittee shall take appropriate action to minimize emissions from the affected facility while the corrective actions are being implemented. IDEM, OAM shall notify the Permittee within thirty (30) days, if the corrective actions taken are deficient. The Permittee shall submit a description of additional corrective actions taken to IDEM, OAM within thirty (30) days of receipt of the notice of deficiency. IDEM, OAM reserves the authority to use enforcement activities to resolve noncompliant stack tests.
 - (b) A retest to demonstrate compliance shall be performed within one hundred twenty (120) days of receipt of the original test results. Should the Permittee demonstrate to IDEM, OAM that retesting in one-hundred and twenty (120) days is not practicable, IDEM, OAM may extend the retesting deadline. Failure of the second

test to demonstrate compliance with the appropriate approval conditions may be grounds for immediate revocation of the approval to operate the affected facility.

(c) IDEM, OAM reserves the authority to use enforcement activities to resolve noncompliant stack tests.

The documents submitted pursuant to this condition do not require the certification by the "responsible official" as defined by 326 IAC 2-7-1(34).

Response 10:

Condition C.8 has been revised as follows:.

- C.8 Actions Related to Noncompliance Demonstrated by a Stack Test [326 IAC 2-7-5] [326 IAC 2-7-6]
 - (a) When the results of a stack test performed in conformance with Section C Performance Testing, of this approval exceed the level specified in any condition of this approval, the Permittee shall take appropriate corrective actions. The Permittee shall submit a description of these corrective actions to IDEM, OAM, within thirty (30) days of receipt of the test results. The Permittee shall take appropriate action to minimize emissions from the affected facility while the corrective actions are being implemented. IDEM, OAM shall notify the Permittee within thirty (30) days, if the corrective actions taken are deficient. The Permittee shall submit a description of additional corrective actions taken to IDEM, OAM within thirty (30) days of receipt of the notice of deficiency. IDEM, OAM reserves the authority to use enforcement activities to resolve noncompliant stack tests.
 - (b) A retest to demonstrate compliance shall be performed within one hundred twenty (120) days of receipt of the original test results. Should the Permittee demonstrate to IDEM, OAM that retesting in one-hundred and twenty (120) days is not practicable, IDEM, OAM may extend the retesting deadline. Failure of the second test to demonstrate compliance with the appropriate approval conditions may be grounds for immediate revocation of the approval to operate the affected facility.
 - (c) IDEM, OAM reserves the authority to use enforcement activities to resolve noncompliant stack tests.

The documents submitted pursuant to this condition do not require the certification by the "responsible official" as defined by 326 IAC 2-7-1(34).

Comment 11:

Delete sections (a), (b) and (c) of Condition C.9 and add wording in section (d) as follows:

- C.9 Monitoring Data Availability [326 IAC 2-7-6(1)] [326 IAC 2-7-5(3)]
 - (a) With the exception of performance tests conducted in accordance with Section C-Performance Testing, all observations, sampling, maintenance procedures, and record keeping, required as a condition of this approval shall be performed at all times the equipment is operating at normal representative conditions.
 - (b) As an alternative to the observations, sampling, maintenance procedures, and

record keeping of subsection (a) above, when the equipment listed in Section D of this approval is not operating, the Permittee shall either record the fact that the equipment is shut down or perform the observations, sampling, maintenance procedures, and record keeping that would otherwise be required by this approval.

- (c) If the equipment is operating but abnormal conditions prevail, additional observations and sampling should be taken with a record made of the nature of the abnormality.
- (d) If for reasons beyond its control, the operator fails to make required observations, sampling, maintenance procedures, or record keeping, as specifically required in Section D Compliance Monitoring and Record Keeping Requirements, reasons for this must be recorded.

Response 11:

Condition C.9 has been revised as follows:

C.9 Monitoring Data Availability [326 IAC 2-7-6(1)] [326 IAC 2-7-5(3)]

- (a) With the exception of performance tests conducted in accordance with Section C-Performance Testing, all observations, sampling, maintenance procedures, and record keeping, required as a condition of this approval shall be performed at all times the equipment is operating at normal representative conditions.
- (b) As an alternative to the observations, sampling, maintenance procedures, and record keeping of subsection (a) above, when the equipment listed in Section D of this approval is not operating, the Permittee shall either record the fact that the equipment is shut down or perform the observations, sampling, maintenance procedures, and record keeping that would otherwise be required by this approval.
- (c) If the equipment is operating but abnormal conditions prevail, additional observations and sampling should be taken with a record made of the nature of the abnormality.
- (ad) If for reasons beyond its control, the operator fails to make required observations, sampling, maintenance procedures, or record keeping, as specifically required in Section D Compliance Monitoring and Record Keeping Requirements, reasons for this must be recorded.
- (be) At its discretion, IDEM may excuse such failure providing adequate justification is documented and such failures do not exceed five percent (5%) of the operating time in any quarter.
- (cf) Temporary, unscheduled unavailability of staff qualified to perform the required observations, sampling, maintenance procedures, or record keeping shall be considered a valid reason for failure to perform the requirements stated in (a) above.

Comment 12:

Make the following changes in Condition C.10(b and c) and delete Condition C.10(c)(4):

C.10 General Record Keeping Requirements [326 IAC 2-7-5(3)][326 IAC 2-7-6]

- (a) Records of all required monitoring data and support information shall be retained for a period of at least five (5) years from the date of monitoring sample, measurement, report, or application. These records shall be kept at the source location for a minimum of three (3) years and available upon the request of an IDEM, OAM, representative. The records may be stored elsewhere for the remaining two (2) years as long as they are available upon request. If the Commissioner makes a written request for records to the Permittee, the Permittee shall furnish the records to the Commissioner within a reasonable time.
- (b) Records of required monitoring information shall include, where applicable specified in Section D:
 - (1) The date, place, and time of sampling or measurements:
 - (2) The dates analyses were performed;
 - (3) The company or entity performing the analyses;
 - (4) The analytic techniques or methods used;
 - (5) The results of such analyses; and
 - (6) The operating conditions existing at the time of sampling or measurement.
- (c) Support information shall include, where applicable specified in Section D:
 - (1) Copies of all reports required by this approval;
 - (2) All original strip chart recordings for continuous monitoring instrumentation;
 - (3) All calibration and maintenance records;
 - (4) Records of preventive maintenance shall be sufficient to demonstrate that failure to implement the Preventive Maintenance Plan did not cause or contribute to a violation of any limitation on emissions or potential to emit. To be relied upon subsequent to any such violation, these records may include, but are not limited to: work orders, parts inventories, and operator's standard operating procedures. Records of response steps taken shall indicate whether the response steps were performed in accordance with the Compliance Response Plan required by Section C Compliance Monitoring Plan Failure to take Response Steps, of this approval, and whether a deviation from an approval condition was reported. All records shall briefly describe what maintenance and response steps were taken and indicate who performed the tasks.
- (d) All record keeping requirements not already legally required shall be implemented within ninety (90) days of approval issuance.

Response 12:

Condition C.10 has been revised as follows:

Page 10 of 11 Source Modification No. 141-12169-00172

C.10 General Record Keeping Requirements [326 IAC 2-7-5(3)][326 IAC 2-7-6]

- (a) Records of all required monitoring data and support information shall be retained for a period of at least five (5) years from the date of monitoring sample, measurement, report, or application. These records shall be kept at the source location for a minimum of three (3) years and available upon the request of an IDEM, OAM, representative. The records may be stored elsewhere for the remaining two (2) years as long as they are available upon request. If the Commissioner makes a written request for records to the Permittee, the Permittee shall furnish the records to the Commissioner within a reasonable time.
- (b) Records of required monitoring information shall include, where applicable specified in Section D:
 - (1) The date, place, and time of sampling or measurements;
 - (2) The dates analyses were performed;
 - (3) The company or entity performing the analyses;
 - (4) The analytic techniques or methods used;
 - (5) The results of such analyses; and
 - (6) The operating conditions existing at the time of sampling or measurement.
- (c) Support information shall include, where applicable specified in Section D:
 - (1) Copies of all reports required by this approval;
 - (2) All original strip chart recordings for continuous monitoring instrumentation;
 - (3) All calibration and maintenance records;
 - (4) Records of preventive maintenance. shall be sufficient to demonstrate that failure to implement the Preventive Maintenance Plan did not cause or contribute to a violation of any limitation on emissions or potential to emit. To be relied upon subsequent to any such violation, these records may include, but are not limited to: work orders, parts inventories, and operator's standard operating procedures. Records of response steps taken shall indicate whether the response steps were performed in accordance with the Compliance Response Plan required by Section C Compliance Monitoring Plan Failure to take Response Steps, of this approval, and whether a deviation from an approval condition was reported. All records shall briefly describe what maintenance and response steps were taken and indicate who performed the tasks.
- (d) All record keeping requirements not already legally required shall be implemented within ninety (90) days of approval issuance.

Page 11 of 11 Source Modification No. 141-12169-00172

Comment 13:

Change Condition D.1.3 to semi-annual reporting.

Response 13:

Condition D.1.3 can not be changed since quarterly reporting is required for the fuel limit to avoid PSD applicability.

Indiana Department of Environmental Management Office of Air Management

Technical Support Document (TSD) for a Part 70 Significant Source Modification

Source Background and Description

Source Name: Honeywell International, Inc.

Source Location: 3520 Westmoor Street, South Bend, Indiana 46628-1373

County: St. Joseph
SIC Code: 3728 and 3724
Operation Permit No.: T 141-7442-00172
Operation Permit Issuance Date: Not Yet Issued
Significant Source Modification No.: 141-12169-00172
Permit Reviewer: Frank P. Castelli

The Office of Air Management (OAM) has reviewed a modification application from Honeywell International, Inc. relating to the construction of the following emission units and pollution control devices:

Eight (8) natural gas-fired turbines, identified as GT-1 through GT-8, rated at 8.71 million British thermal units per hour each, exhausting through Stack SGT-1 through SGT-8.

History

On April 13, 2000, Honeywell International, Inc. submitted an application to the OAM requesting to add eight (8) natural gas-fired turbines to their existing plant. In December, 1999, the company name was changed to Honeywell International, Inc. from AlliedSignal, Inc.

This proposed turbine electricity generation project is a completely separate project from Source Modification 141-11511-00172, which allows for the construction and operation of three (3) Carbon Vapor Deposition (CVD) units, numbered 22 - 24. The turbine project is a cost-saving effort to generate electricity for the entire source at lower costs during times of peak demand. The turbines will burn only natural gas and will have nothing to do with controlling emissions from any of the CVD units. The turbine/electricity project is unrelated to the additions of CVDs 22 - 24.

Honeywell International, Inc. does not intend to generate electricity for sale. All of the electricity generated will be for use by the source. Therefore, the source will not be subject to any power tariffs. The source will generate electricity during periods of high electric demand in order to offset the related high electric costs.

Existing Approvals

The source applied for a Part 70 Operating Permit T 141-7442-00172 on December 10, 1996. The source has been operating under previous approvals including, but not limited to the following:

Page 2 of 7 Source Modification No.: 141-12169-00172

- (a) CP 141-9999-00172, issued on December 14, 1998,
- (b) Source Modification 141-10759-00172, issued on October 20, 1999,
- (c) Source Modification 141-11205-00172, issued October 20, 1999, and
- (d) Source Modification 141-11511-00172, issued on March 8, 2000.

Enforcement Issue

There are no enforcement actions pending.

Stack Summary

Stack ID	Operation	Height (feet)	Diameter (feet)	Flow Rate (acfm)	Temperature (EF)	
SGT-1 - SGT-8	Gas Turbines	16.0	2.0	6,480	925	

Recommendation

The staff recommends to the Commissioner that the Part 70 Significant Source Modification be approved. This recommendation is based on the following facts and conditions:

Unless otherwise stated, information used in this review was derived from the application and additional information submitted by the applicant.

An application for the purposes of this review was received on April 13, 2000. Additional information was received on May 23, 2000.

Emission Calculations

See page1 of Appendix A of this document for detailed emissions calculations.

Potential To Emit of Modification

Pursuant to 326 IAC 2-1.1-1(16), Potential to Emit is defined as "the maximum capacity of a stationary source to emit any air pollutant under its physical and operational design. Any physical or operational limitation on the capacity of a source to emit an air pollutant, including air pollution control equipment and restrictions on hours of operation or type or amount of material combusted, stored, or processed shall be treated as part of its design if the limitation is enforceable by the U.S. EPA."

This table reflects the PTE before controls. Control equipment is not considered federally enforceable until it has been required in a federally enforceable permit.

Pollutant	Potential To Emit (tons/year)
PM	12.8
PM ₁₀	12.8
SO ₂	0.183

Page 3 of 7 Source Modification No.: 141-12169-00172

Pollutant	Potential To Emit (tons/year)
VOC	7.33
CO	33.6
NO _x	134

HAPs	Potential To Emit (tons/year)
Formaldehyde	1.04
PAHs	0.055
Benzene	0.043
Naphthalene	0.043
Toluene	0.040
Acetaldehyde	0.024
Propylene Oxide	0.009
Xylene	0.008
Ethyl benzene	0.007
Lead	0.005
Acrolein	0.002
Manganese Compounds	0.0005
Chromium Compounds	0.0004
Cadmium Compounds	0.0003
1,3 Butadiene	0.0001
Mercury	0.0001
NDMA	0.00007
NMMOR	0.00007
TMA	0.00005
Arsenic	0.00002
TOTAL	1.28

Actual Emissions

The following table shows the actual emissions from the source. This information reflects the 1998 OAM emission data and HAPs data from AlliedSignal Inc.

Page 4 of 7 Source Modification No.: 141-12169-00172

Pollutant	Actual Emissions (tons/year)
PM	1.35
PM ₁₀	-
SO ₂	-
VOC	374.7
CO	-
NO _x	-
Benzene	4.9
Cresols	3.9
Methanol	0.36
Methyl Chloroform	4.9
Methyl Ethyl Ketone	2.5
Methylene Chloride	0.06
Naphthalene	0.25
Phenol	5.9
Styrene	0.28
Toluene	2.7
Xylenes	0.1

County Attainment Status

The source is located in St. Joseph County.

Pollutant	Status
PM ₁₀	attainment
SO ₂	attainment
NO ₂	attainment
Ozone	maintenance
CO	attainment
Lead	attainment

(a) Volatile organic compounds (VOC) and oxides of nitrogen (NOx) are precursors for the formation of ozone. Therefore, VOC and NO_X emissions are considered when evaluating the rule applicability relating to the ozone standards. St. Joseph County has been designated as attainment or unclassifiable for ozone. Therefore, VOC and NOx emissions were reviewed pursuant to the requirements for Prevention of Significant Deterioration (PSD), 326 IAC 2-2 and 40 CFR 52.21.

Page 5 of 7 Source Modification No.: 141-12169-00172

(b) St. Joseph County has been classified as attainment or unclassifiable for the remaining criteria pollutants. Therefore, these emissions were reviewed pursuant to the requirements for Prevention of Significant Deterioration (PSD), 326 IAC 2-2 and 40 CFR 52.21.

(c) Fugitive Emissions

Since this type of operation is not one of the 28 listed source categories under 326 IAC 2-2 and since there are no applicable New Source Performance Standards that were in effect on August 7, 1980, the fugitive PM emissions are not counted toward determination of PSD and Emission Offset applicability.

Source Status

Existing Source PSD or Emission Offset Definition (emissions after controls, based upon 8760 hours of operation per year at rated capacity and/or as otherwise limited):

Pollutant	Emissions (tons/year)
PM	0.8
PM ₁₀	0.0
SO ₂	0.0
VOC	678
СО	0.0
NO _x	0.0

- (a) This existing source is a major stationary source because an attainment regulated pollutant is emitted at a rate of two hundred fifty (250) tons per year or more, and it is not one of the 28 listed source categories.
- (b) These emissions are based upon the Technical Support Document for Source Modification 141-11511, issued March 8, 2000.

Potential to Emit of Modification After Issuance

The table below summarizes the potential to emit, reflecting all limits, of the significant emission units after controls. The control equipment is considered federally enforceable only after issuance of this Part 70 source modification.

Pollutant	PM (tons/yr)	PM ₁₀ (tons/yr)	SO ₂ (tons/yr)	VOC (tons/yr)	CO (tons/yr)	NO _x (tons/yr)
Proposed Modification	3.77	3.77	0.054	2.16	9.90	39.6
Contemporaneous Increases	0.00	0.00	0.000	0.00	0.00	00.0
Contemporaneous Decreases	0.00	0.00	0.000	0.00	0.00	00.0
Net Emissions	3.77	3.77	0.054	2.16	9.90	39.6
PSD Significant Levels	25	15	40	40	100	40

Honeywell International, Inc.

Page 6 of 7
South Bend, Indiana

Source Modification No.: 141-12169-00172

Permit Reviewer: FPC/MES

(a) This modification to an existing major stationary source is not major because the emissions increase is less than the PSD significant levels. Therefore, pursuant to 326 IAC 2-2, and 40 CFR 52.21, the PSD requirements do not apply.

(b) NO_X is limited to 39.6 tons per year. Therefore, the requirements of 326 IAC 2-2 do not apply. This limit is equivalent to a natural gas throughput of 180 million cubic feet of gas per year as shown on page 1 of Appendix A.

Part 70 Permit Determination

326 IAC 2-7 (Part 70 Permit Program)

This existing source has submitted their Part 70 (T 141-7442-00172) application on December 10, 1996. The eight (8) natural gas-fired turbines being reviewed under this permit shall be incorporated in the submitted Part 70 application.

Justification for Modification

- (a) The Part 70 Operating Permit is being modified through a Part 70 Significant Source Modification to a yet to be issued Part 70 Operating Permit because the potential to emit before controls of this modification exceeds twenty five (25) tons per year. This modification is being performed pursuant to 326 IAC 2-7-10.5(f)(4).
- (b) Since the Part 70 Operating Permit for this source has not been issued yet, the approval of this Significant Source Modification will allow the source to construct and operate.

Federal Rule Applicability

- (a) The eight (8) 8.71 million British thermal units per hour turbines are not subject to the requirements of the New Source Performance Standard, 326 IAC 12, (40 CFR 60. 330, Subpart GG, Standards of Performance for Stationary Gas Turbines), to be installed after the October 3, 1977 applicability date because each turbine has a heat input rate of less than 11.3 million British thermal units per hour.
- (b) There are no National Emission Standards for Hazardous Air Pollutants (NESHAPs) (326 IAC 14 and 40 CFR Part 63) applicable to this proposed modification.

State Rule Applicability - Individual Facilities

326 IAC 2-4.1-1 (New Source Toxics Control)

Each turbine is independently distinguishable from the other units as a "process or production unit" as defined in 40 CFR 63.41 (incorporated by reference in 326 IAC 2-4.1). The potential to emit (PTE) of combined hazardous air pollutants (HAPs) for each turbine is less than twenty-five (25) tons per year and the potential to emit (PTE) of any single HAP is less than ten (10) tons per year. See page 1 of Appendix A of the TSD for detailed calculations. Therefore, the requirements of this rule do not apply.

326 IAC 5-1 (Opacity)

Pursuant to 326 IAC 5-1-2 (Opacity Limitations), except as provided in 326 IAC 5-1-3 (Temporary alternative opacity limitations), visible emissions shall meet the following, unless otherwise stated in this approval:

Honeywell International, Inc. South Bend, Indiana Source Modification No.: 141-12169-00172 Permit Reviewer: FPC/MES

Opacity shall not exceed an average of thirty percent (30%) in any one (1) six (6) minute (a) averaging period as determined in 326 IAC 5-1-4.

Page 7 of 7

Opacity shall not exceed sixty percent (60%) for more than a cumulative total of fifteen (15) (b) minutes (sixty (60) readings) as measured according to 40 CFR 60, Appendix A, Method 9 or fifteen (15) one (1) minute nonoverlapping integrated averages for a continuous opacity monitor in a six (6) hour period.

326 IAC 6-1-2 (Nonattainment Area Particulate Limitations)

This source is not subject to the provisions of 326 IAC 6-1-2 because although the source is located in St. Joseph County, it does not have specific emission limits listed in 326 IAC 6-1-18, and it does not have the potential to emit one hundred (100) tons or more of PM per year or have actual emissions of ten (10) tons or more of PM per year.

326 IAC 8-1-6 (New Facilities, General Reduction Requirements)

This rule is not applicable to the eight (8) turbines because while the units will be constructed after January 1, 1980, the potential uncontrolled VOC emissions are less than twenty-five (25) tons per year.

326 IAC 7-1.1 (Sulfur dioxide emission limitations)

This rule is not applicable to the eight (8) turbines because the potential uncontrolled SO₂ emissions are less than twenty-five (25) tons per year.

Compliance Requirements

Permits issued under 326 IAC 2-7 are required to ensure that sources can demonstrate compliance with applicable state and federal rules on a more or less continuous basis. All state and federal rules contain compliance provisions, however, these provisions do not always fulfill the requirement for a more or less continuous demonstration. When this occurs IDEM, OAM, in conjunction with the source, must develop specific conditions to satisfy 326 IAC 2-7-5. As a result, compliance requirements are divided into two sections: Compliance Determination Requirements and Compliance Monitoring Requirements.

Compliance Determination Requirements in Section D of the permit are those conditions that are found more or less directly within state and federal rules and the violation of which serves as grounds for enforcement action. If these conditions are not sufficient to demonstrate continuous compliance, they will be supplemented with Compliance Monitoring Requirements, also Section D of the permit. Unlike Compliance Determination Requirements, failure to meet Compliance Monitoring conditions would serve as a trigger for corrective actions and not grounds for enforcement action. However, a violation in relation to a compliance monitoring condition will arise through a source's failure to take the appropriate corrective actions within a specific time period.

There are no compliance monitoring requirements applicable to this modification.

Conclusion

The construction and/or operation of the eight (8) natural gas-fired turbines shall be subject to the conditions of the attached proposed Significant Source Modification No. 141-12169-00172.

mmbtu/hr each

Natural Gas-Fired Turbines

Company Name: Honeywell International, Inc.

Address City IN Zip: 3520 Westmoor Street, South Bend, Indiana 46628

Source Modification: 141-12169 PIt ID: 141-00172 Reviewer: Frank P. Castelli

Date: April 13, 2000

Eight (8) at **Heat Input Capacity** Potential Throughput Limited Throughput 8.71

MMBtu/hr MMCF/yr MMCF/yr

69.7 610.4 180.0

Pollutant

		i oliataiii	•			
	PM	PM10	SO2	NOx	VOC	СО
Emission Factor in lb/MMBtu	0.0419	0.0419	0.0006	0.4400	0.0240	0.1100
Potential Emission in lbs/hr	2.920	2.920	0.042	30.659	1.672	7.665
Potential Emission in tons/yr	12.788	12.788	0.183	134.287	7.325	33.572
Limited Emissions in tons/yr	3.771	3.771	0.054	39.6	2.16	9.90

Methodology

MMBtu = 1,000,000 Btu

MMCF = 1,000,000 Cubic Feet of Gas

Potential Throughput (MMCF) = Heat Input Capacity (MMBtu/hr) x 8,760 hrs/yr x 1 MMCF/1,000 MMBtu Emission Factors from AP 42, Chapter 3.1, Table 3. 1-2

Emission (tons/yr) = Throughput (MMBtu/hr) x Emission Factor (lbs/MMBtu)*8760/2,000 lb/ton

	Emission Factor	PTE	PTE	Limited PTE
HAPs	(lbs/MMBtu)	(lbs/hr)	(tons/yr)	(tons/yr)
Formaldehyde	0.0034	0.236912	1.037675	0.306000
PAHs	0.00018	0.0125424	0.054936	0.016200
Benzene	0.00014	0.0097552	0.042728	0.012600
Napthalene	0.00014	0.0097552	0.042728	0.012600
Toluene	0.00013	0.0090584	0.039676	0.011700
Acetaldehyde	0.00008	0.0055744	0.024416	0.007200
Propylene Oxide	0.000029	0.00202072	0.008851	0.002610
Xylene	0.000027	0.00188136	0.008240	0.002430
Ethylbenzene	0.000024	0.00167232	0.007325	0.002160
Lead	0.000016	0.00111488	0.004883	0.001440
Acrolein	7.9000000E-06	0.00055047	0.002411	0.000711
Manganese	1.6000000E-06	0.00011149	0.000488	0.000144
Chromium	1.3000000E-06	0.00009058	0.000397	0.000117
Cadmium	8.4000000E-07	0.00005853	0.000256	0.000076
1,3 Butadiene	4.4000000E-07	0.00003066	0.000134	0.000040
Mercury	4.4000000E-07	0.00003066	0.000134	0.000040
NDMA	2.3000000E-07	0.00001603	0.000070	0.000021
NMMOR	2.3000000E-06	0.00016026	0.000702	0.000207
TMA	1.7000000E-07	0.00001185	0.000052	0.000015
Arsenic	4.9000000E-08	3.414E-06	0.000015	0.000004
		Total	1.276	0.376